# TELEFUNKEN SERVICE

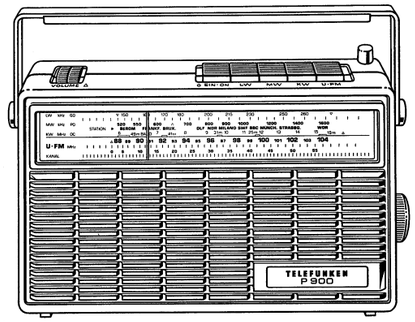
**P 900**

**Druck-Nr. 319 407 055**

**Schaltplan – Lagepläne**
**Service-Einstellungen**

**Schematic Diagramm – Component Layouts**
**Service Adjustment**

**Schéma – Plan de localisation**
**Réglage de service**




## Technische Daten

| | |
|---|---|
| Stromversorgung: | **Batterie:** 7,5 Volt, 5 Babyzellen à 1,5 Volt<br>**Netz:** eingebautes Netzteil 220 Volt ~, mit elektronischer Umschaltung Batterie-/Netzbetrieb. |
| Sicherung: | T 500 mA |
| Halbleiter: | 2 IC's, 3 Transistoren, 3 Dioden, 1 Z-Diode, 1 Gleichrichter |
| Lautsprecher: | perm. dyn. 80×140 mm, Z=8 Ohm |
| Ausgangsleistung: | 0,6 Watt bei Batteriebetrieb<br>2,5 Watt bei Netzbetrieb |
| Wellenbereiche: | UKW = 87,5 ... 104 MHz<br>KW = 5,9 ... 15,5 MHz (49–19 m)<br>MW = 515 ... 1615 kHz<br>LW = 148 ... 265 kHz |

| | |
|---|---|
| Kreise: | AM 6 Kreise, davon 2 veränderbar durch C<br>FM 10 Kreise, davon 2 veränderbar durch C |
| Zwischenfrequenz: | AM 460 kHz<br>FM 10,7 MHz |
| Antennen: | Ferritantenne für MW/LW,<br>Teleskopantenne für UKW/KW |
| Drucktasten: | EIN/AUS, LW, MW, KW, UKW. |
| Anschlüsse: | KH-Buchse 3,5 mm ∅ |
| Gewicht: | ca. 1,7 kg (ohne Batterien) |
| Maße (B/H/T): | ca. 256×156×68 mm |

## Technical data

| | |
|---|---|
| Power supply: | **battery:** 7,5 V, 5 baby cells of 1,5 V each<br>**mains:** incorporated mains unit 220 V ~, with electronic conversion battery/mains operation. |
| Fuse: | T 500 mA |
| Semi-conductors: | 2 IC's, 3 transistors, 3 diodes, 1 Z-diode, 1 rectifier. |
| Loudspeaker: | perm. dyn. 80×140 mm, Z=8 Ohm |
| Output power: | 0,6 W at battery operations<br>2,5 W at mains operation |
| Wave ranges: | FM = 87,5 ... 104 MHz<br>SW = 5,9 ... 15,5 MHz (49–19 m)<br>MW = 515 ... 1615 kHz<br>LW = 148 ... 265 kHz |

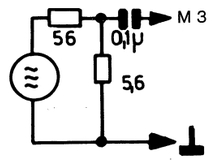
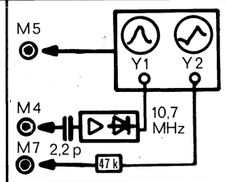
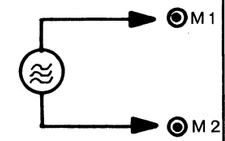
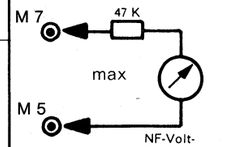
| | |
|---|---|
| Circuits: | AM 6 circuits, 2 of which variable by C<br>FM 10 circuits, 2 of which variable by C |
| Intermediate frequency: | AM 460 kHz<br>FM 10,7 MHz |
| Aerials: | Ferrite aerial for AM,<br>Telescopic Aerial for FM |
| Push buttons: | ON/OFF, LW, MW, SW, FM. |
| Sockets: | earphone 3,5 mm ∅ |
| Weight: | approx. 1,7 kg (without batteries) |
| Dimensions: | (W/H/D) approx. 256×156×68 mm |

## Caractéristiques techniques

| | |
|---|---|
| Alimentation courant: | **piles:** 7,5 V, 5 éléments «baby» à 1,5 V<br>**secteur:** bloc secteur incorporé 220 V ~, avec commutation piles/secteur électronique. |
| Fusible: | T 500 mA |
| Semi-conducteurs: | 2 circuits intégrés<br>3 transistors, 3 diodes, 1 diode Z,<br>1 redresseur |
| Haut-parleur: | perm. dyn. 80×140 mm, Z=8 Ohm |
| Puissance de sortie: | 0,6 W fonctionnement piles<br>2,5 W fonctionnement secteur |
| Gammes d'ondes: | FM = 87,5 ... 104 MHz<br>OC = 5,9 ... 15,5 MHz (49–19 m)<br>PO = 515 ... 1615 kHz<br>GO = 148 ... 265 kHz |

| | |
|---|---|
| Circuits: | AM 6 circuits dont 2 variables par C<br>FM 10 circuits dont 2 variables par C |
| Fréquence intermédiaire: | AM 460 kHz<br>FM 10,7 MHz |
| Antennes: | Antenne ferrite pour PO/GO,<br>Antenne télescopique pour FM/OC |
| Touches: | MARCHE/ARRET, GO, PO, OC, FM. |
| Prises: | prise écouteur 3,5 mm ∅ |
| Poids: | 1,7 kilos environ (sans les piles) |
| Dimensions: | (L×H×P) environ 256×156×68 mm |

## FM-Abgleich · FM Alignment · Alignement FM

| | Meßsender, Wobbler generator, generateur<br>Anschluß connection, couplage | Frequenz frequency | Empfänger receiver, recepteur<br>Abgleichfolge alignment, alignement | Oszillograf, Voltmeter oscilloscope voltmeter, voltmetre | Bemerkungen remarks observations |
|---|---|---|---|---|---|
| ZF/ IF |  | 10,7 MHz gewobbelt | 94 MHz<br>Fl 6*<br>Fl 7*<br>Fl 8** |  | **Vorverstärker 10,7 MHz und anschließenden Gleichrichter verwenden.**<br>Use preamplifier followed by a rectifier.<br>Prenez préampli 10,7 MHz et redresseur. |
| HF/ RF |  | 89 MHz<br>104 MHz | Oszillator oscillateur: L 8 C 32<br>Zwischenkreis R.F. int. circ.: L 6 C 24 |  | Teleskopantenne abtrennen<br>Disconnect. Telesc. ant.<br>Debrancher l'antenne telesc. |

*) auf maximalen Flächeninhalt und symmetrischen Kurvenverlauf abgleichen

**) auf Symmetrie der Demodulatorkennlinie

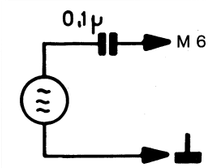
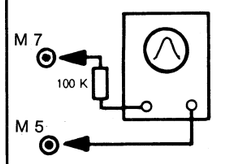
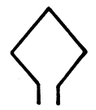
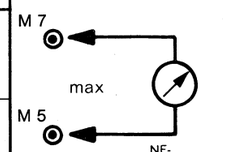
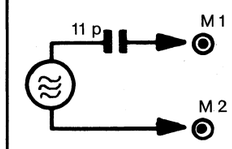
*) align to **maximum surface** and steady curve course

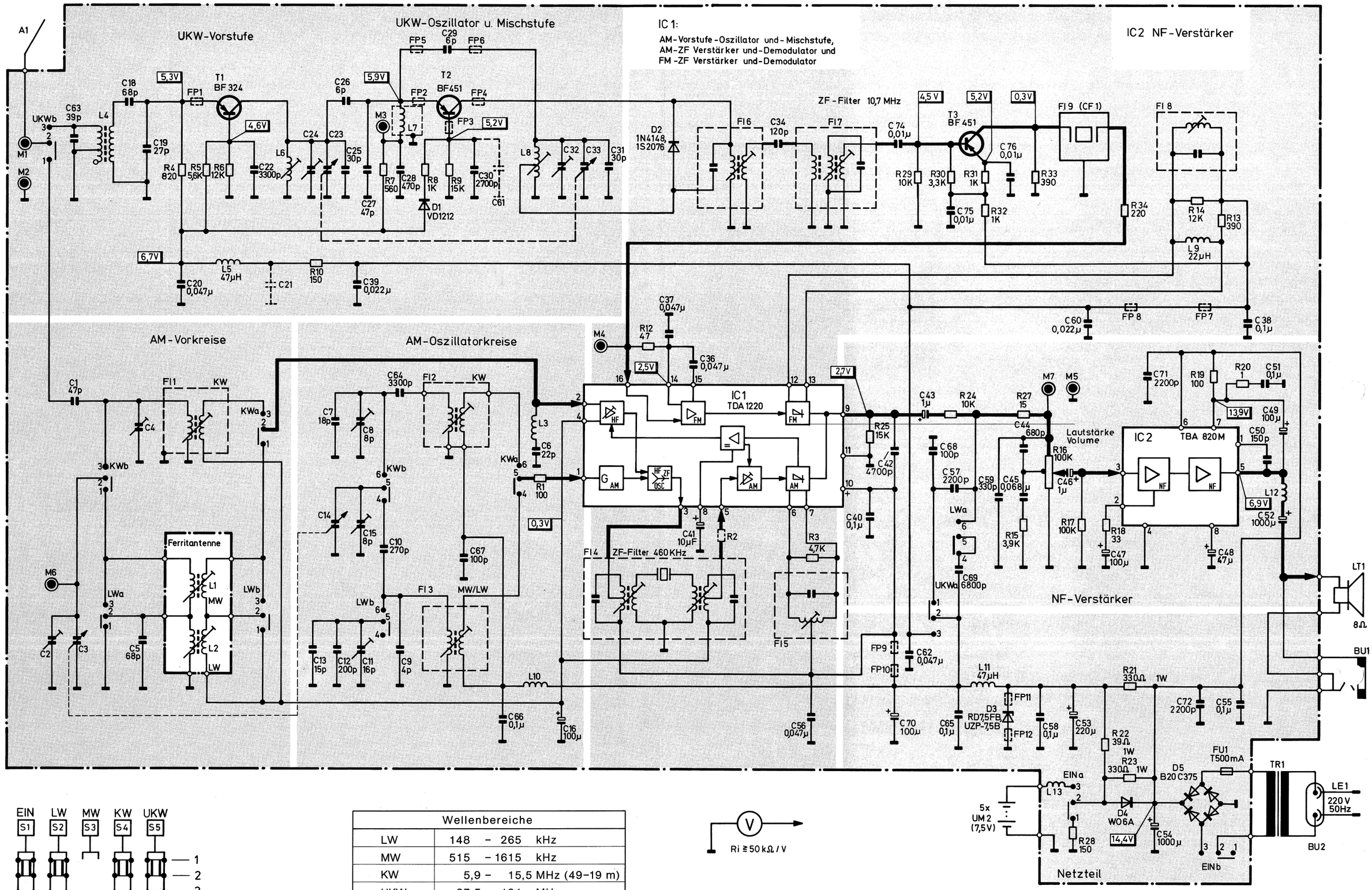
**) adjust **symmetrically** to demodulator curve

*) aligner sur surface maximale et marche de courbe constante

**) à regler **symétriquement sur la courbe** démodulatrice.

## AM-Abgleich · AM-Alignment · Alignement AM

| | Meßsender, Wobbler generator, generateur<br>Anschluß connection, couplage | Frequenz frequency | Empfänger receiver, recepteur<br>Abgleichfolge alignment, alignement | Oszillograf, Voltmeter oscilloscope, voltmeter, voltmetre | Bemerkungen remarks observations |
|---|---|---|---|---|---|
| ZF/ IF |  | ca. 460 kHz<br>≤ 25 Hz<br>MW | Fl 4<br>Fl 5 |  | Lautstärke-steller auf Linksanschlag<br>volume control at left-hand stop |
| MW/ PO |  | 520 kHz<br>1600 kHz | Oszillator, oscillateur<br>Fl 3<br>C 15 | | |
| | | 600 kHz<br>1400 kHz | Vorkreis, R.F. inp. circ.<br>L 1<br>C 2 | | |
| LW/ GO | | 200 kHz | Oszillator, oscillateur<br>C 11 |  | |
| | | 200 kHz | Vorkreis, R.F. inp. circ.<br>L 2 | | |
| KW/ SW/ OC |  | 5,9 MHz<br>15,0 MHz | Oszillator, oscillateur<br>Fl 2<br>C 8 | | Teleskopantenne abtrennen<br>Disconnect. Telesc. ant.<br>Debrancher l'antenne telesc. |
| | | 6,9 MHz<br>14,5 MHz | Vorkreis, R.F. inp. circ.<br>Fl 1<br>C 4 | | |



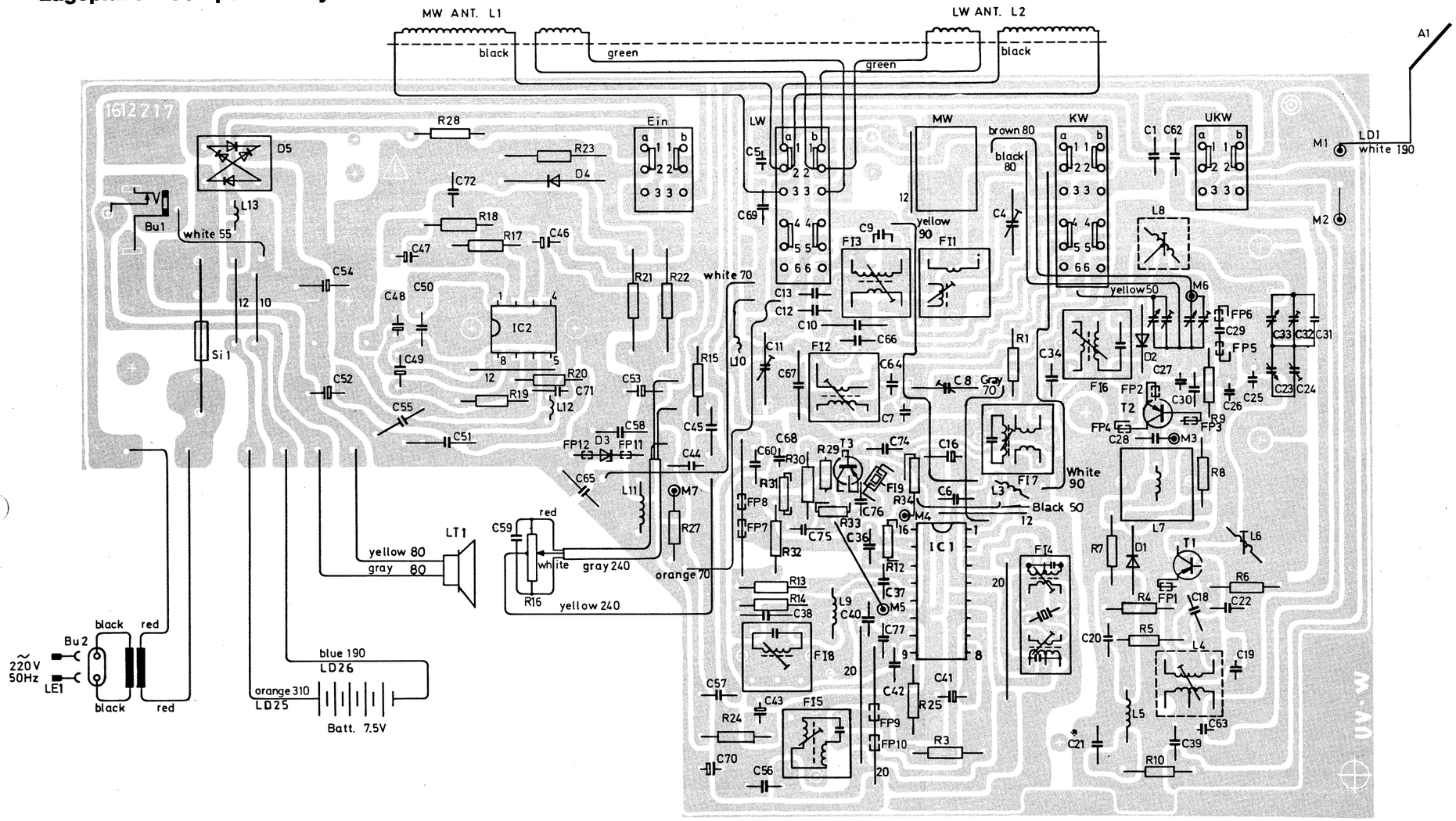

| Wellenbereiche | | |
|---|---|---|
| LW | 148 – 265 | kHz |
| MW | 515 – 1615 | kHz |
| KW | 5,9 – 15,5 | MHz (49–19 m) |
| UKW | 87,5 – 104 | MHz |

ZF: FM = 10,7 MHz; AM = 460 kHz

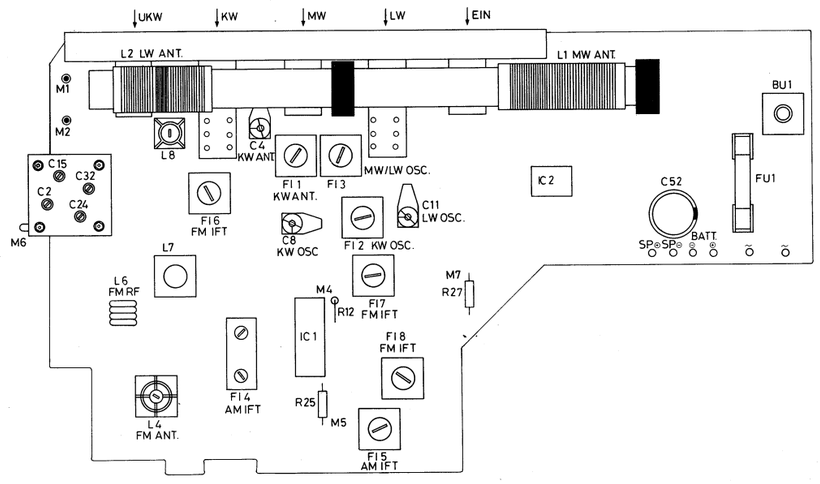
# Telefunken P 900

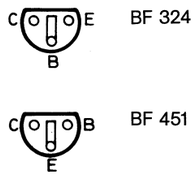
# Lagepläne · Component Layout · Plan de localisation

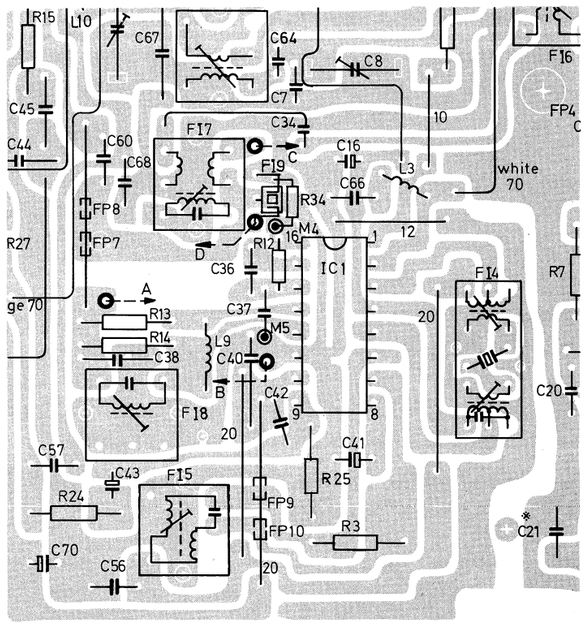
**Version B**



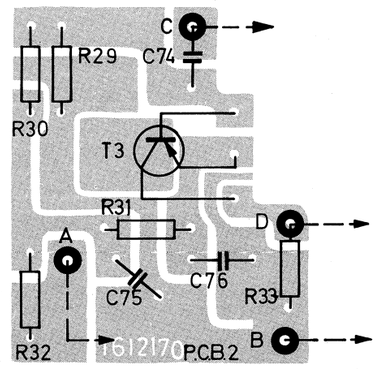

## Abgleichpunkte · Alignment points · Points d'alignement



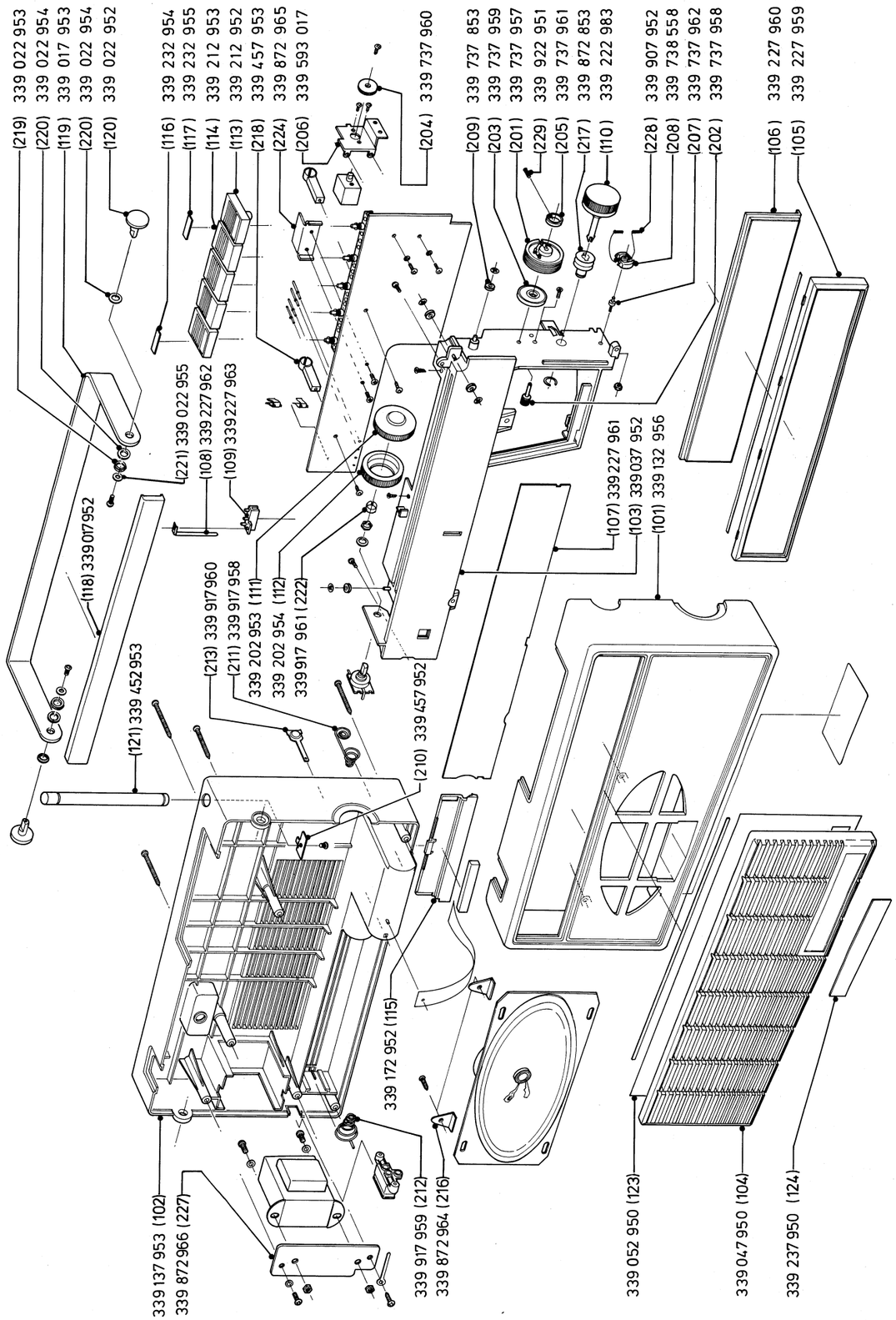




**Version A**



## Explodierte Darstellung · Exploded view Depiction · Presentation Explosée



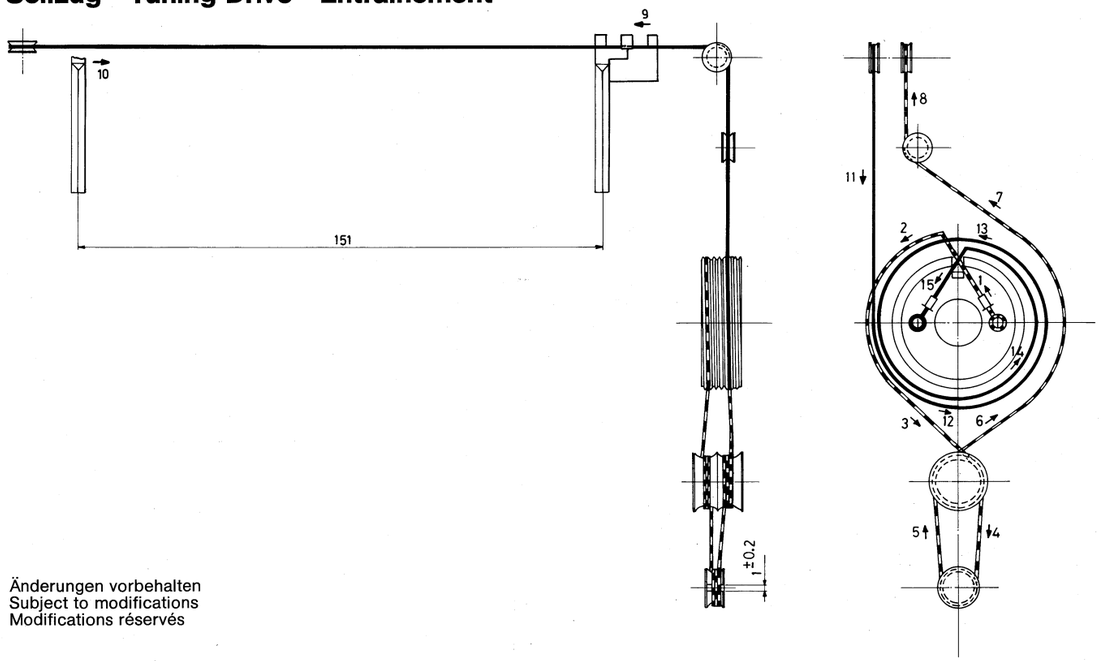

**Wichtig:** Bei Ersatzteilbestellungen bitte **unbedingt** die neunstellige **Bestellnummer** angeben!
**N. B.:** When demanding Spare Parts it is **absolutely necessary** to quote the nine digit **Part Number!**
**Important:** Lors d'une commande de pièces de rechange, prière d'indiquer le **numéro de la pièce** à 9 chiffres!

## Ersatzteilliste · Spare parts list · Liste de pièces de rechange

**Wichtig:** Bei Ersatzteilbestellungen bitte **unbedingt** die neunstellige **Bestellnummer** angeben!
**N. B.:** When demanding Spare Parts it is **absolutely necessary** to quote the nine digit **Part Number!**
**Important:** Lors d'une commande de pièces de rechange, prière d'indiquer **en tout cas** le **numéro de la pièce** à 9 chiffres!

| Position | Prgr. | Best.-No. | Bezeichnung | Item | Description |
|---|---|---|---|---|---|
| | | | **ELEKTRISCHE TEILE** | **ELECTRICAL PARTS** | **PIECES ELECTRIQUES** |
| 235 | H | 339 337 956 | Leiterplatte | PCB | plaque circuit imprimé |
| BU 1 | T* | 339 540 101 | Buchse | socket | prise |
| BU 2 | E | 339 540 080 | Netzbuchse | AC-socket | prise secteur |
| C 2 | J | 339 593 018 | Drehko | tuning capacitor | condensateur variable |
| C 4/8 | W* | 339 510 025 | Trimmer | trimmer capacitor | condensateur variable |
| C 11 | A | 339 510 037 | Trimmer | trimmer capacitor | condensateur variable |
| D 1 | R* | 339 529 171 | Diode VD 1212 | Diode VD 1212 | Diode VD 1212 |
| D 2 | P* | 309 325 027 | Diode 1 N 4148 | Diode 1 N 4148 | Diode 1 N 4148 |
| D 3 | R* | 339 529 172 | Diode RD 7,5 FB | Diode RD 7,5 FB | Diode RD 7,5 FB |
| D 4 | B | 309 327 019 | Diode WO 6 A/10 D-1 | Diode WO 6 A/10 D-1 | Diode WO 6 A/10 D-1 |
| D 5 | I | 339 520 044 | Diode B 20 C 375 A 4 | Diode B 20 C 375 A 4 | Diode B 20 C 375 A 4 |
| FI 1 | A | 339 347 984 | HF-Spule | RF coil | bobine HF |
| FI 2 | A | 339 367 971 | Oszillatorfilter KW | oscillator filter SW | filtre oscillateur OC |
| FI 3 | W* | 339 367 972 | Oszillatorfilter MW/LW | oscillator filter MW/LW | filtre oscillateur PO/GO |
| FI 4 | F | 339 367 973 | AM-Filter | AM filter | filtre AM |
| FI 5 | W* | 339 367 974 | AM-Filter | AM filter | filtre AM |
| FI 6 | A | 339 367 975 | FM-Filter | FM filter | filtre FM |
| FI 7 | A | 339 367 976 | FM-Filter | FM filter | filtre FM |
| FI 8 | A | 339 367 977 | FM-Filter | FM filter | filtre FM |
| FI 9 | B | 339 367 978 | Keramikfilter | ceramic filter | filtre céramique |
| FP 1–6 | K* | 339 872 967 | Ferritperle | ferrite pearl | perle ferrite |
| FP 7–12 | P* | 339 872 860 | Ferritperle | ferrite pearl | perle ferrite |
| FU 1 | A | 339 570 057 | Sicherung F 500 mA | fuse | fusible |
| IC 1 | M | 339 575 063 | IC-TDA 1220 | IC-TDA 1220 | IC-TDA 1220 |
| IC 2 | J | 339 575 064 | IC-TBA 820 M | IC-TBA 820 M | IC-TBA 820 M |
| L 1/2 | H | 339 347 985 | MW/LW-Antennenspule | MW/LW antenna coil | bobine d'antenne PO/GO |
| L 3 | K* | 339 347 986 | Sperrkreisspule | trap coil | bobine circuit D-absorption |
| L 4 | B | 339 347 850 | HF-Spule | RF coil | bobine HF |
| L 5/11 | R* | 339 347 987 | Drosselspule | choke coil | bobine self |
| L 6 | N* | 339 347 988 | Feder (Spule) | spring coil | bobine flexible |
| L 7 | K* | 339 347 989 | Sperrkreisspule | trap coil | bobine circuit bouchon |
| L 8 | A | 339 347 990 | Spule | coil | bobine |
| L 9 | R* | 339 347 991 | Drosselspule | choke coil | bobine self |
| L 10 | K* | 339 347 992 | Sperrkreisspule | trap coil | bobine circuit bouchon |
| LE 1 | G | 339 480 150 | Netzleitung | AC cord | câble secteur |
| LT 1 | K | 339 322 955 | Lautsprecher | loudspeaker | haut-parleur |
| R 16 | C | 339 502 956 | Lautstärkeeinsteller 100 K | variable resistor | potent. de volume |
| S 1–5 | J | 339 442 968 | Druckschalter | push switch | interrupteur poussoir |
| T 1 | H | 309 001 161 | Transistor BF 324 | Transistor BF 324 | Transistor BF 324 |
| T 2 | W* | 339 556 289 | Transistor BF 451 | Transistor BF 451 | Transistor BF 451 |
| TR 1 | L | 339 312 954 | Netztrafo | mains transformer | transfo d'alimentation secteur |

## Seilzug · Tuning Drive · Entraînement




Änderungen vorbehalten
Subject to modifications
Modifications réservés

Printed in the Federal Republic of Germany UV 83 – 8003